Analytical Data Package Prepared For

Pacific Northwest National Lab

Radiochemical Analysis By

STL Richland STLRL

2800 G.W. Way, Richland Wa, 99354, (509)-375-3131.

Data Package Contains _____ Pages

Report Nbr: 34503

SDG Nbr	ORDER Nbr	CLIENT ID NUMBER	LOT Nbr	WORK ORDER	RPT DB ID	BATCH
W05029A	W06-009	B1KF70	J7B150140-1	JPGDM1AA	9JPGDM10	7046185
		B1KF74	J7B150140-2	JPGDT1AA	9JPGDT10	7046185
		B1KF82	J7B150140-3	JPGDW1AA	9JPGDW10	7046185
		B1KF86	J7B150140-4	JPGD31AA	9JPGD310	7046185
		B1KF90	J7B150140-5	JPGD41AA	9JPGD410	7046185
		B1KF94	J7B150140-6	JPGD61AA	9JPGD610	7046185

Comments:

SEVERN TRENT STL

STL Richland
2800 George Washington Way
Richland, WA 99354

Tel: 509 375 3131 Fax: 509 375 5590
www.stl-inc.com

Certificate of Analysis

Pacific Northwest National Laboratories
Sigma V Building
Richland, WA 99352

February 20, 2007

Attention: Dot Stewart

SAF Number	:	W06-009
Date SDG Closed	:	February 15, 2007
Number of Samples	:	Six (6)
Sample Type	:	Water
SDG Number	:	W05029A
Data Deliverable	:	3-Day / Summary

CASE NARRATIVE

I. Introduction

On February 15, 2007 a request for additional analyses of six water samples was received at STL Richland (STLR). Upon receipt, the samples were assigned the following laboratory ID numbers to correspond with the Pacific Northwest National Laboratories (PGW) specific IDs:

PGW ID#	STLR ID#	MATRIX	DATE OF RECEIPT
B1KF70	JPGDM	WATER	9/28/06
B1KF74	JPGDT	WATER	9/28/06
B1KF82	JPGDW	WATER	9/28/06
B1KF86	JPGD3	WATER	9/28/06
B1KF90	JPGD4	WATER	9/28/06
B1KF94	JPGD6	WATER	9/28/06

II. Sample Receipt

The samples were received in good condition and no anomalies were noted during check-in.

III. Analytical Results/Methodology

The analytical results for this report are presented by laboratory sample ID. Each set of data includes sample identification information, analytical results and the appropriate associated statistical errors.

Pacific Northwest National Laboratories
February 20, 2007

The requested analyses were:

Laser Induced Phosphorimetry
Total Uranium by method RICH-RC-5058

IV. Quality Control

The analytical results for each analysis performed includes a minimum of one laboratory control sample (LCS), one method (reagent) blank, and one duplicate sample analysis. Any exceptions have been noted in the "Comments" section.

QC and sample results are reported in the same units.

V. Comments

Total Uranium
Total Uranium by method RICH-RC-5058:
The LCS, batch blank, samples, sample duplicate (B1KF70), and sample matrix spike (B1KF74) results are within contractual requirements.

I certify that this Certificate of Analysis is in compliance with the SOW, both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager, or a designee as verified by the following signature.

Reviewed and approved:

Sherryl A. Adam
Project Manager

Drinking Water Method Cross References

	DRINKING WATER ASTM METHOD CROSS REFERENCES	
Referenced Method	**Isotope(s)**	**STL Richland's SOP number**
EPA 901.1	Cs-134, I-131	RICH-RC-5017
EPA 900.0	Alpha & Beta	RICH-RC-5014
EPA 903.1	Ra-226	RICH-RC-5005
EPA 904.0	Ra-228	RICH-RC-5005
EPA 905.0	Sr89/90	RICH-RC-5006
ASTM D2460	Total Radium	RICH-RC-5027
Standard Method 7500-U-C & ASTM D5174	Uranium	RICH-RC-5058
EPA 906.0	Tritium	RICH-RC-5007
NOTE:		
The Gross Alpha LCS is prepared with Am-241 (unless otherwise specified in the case narrative)		
The Gross Beta LCS is prepared with Sr/Y-90 (unless otherwise specified in the case narrative)		

Uncertainty Estimation

STL Richland has adopted the internationally accepted approach to estimating uncertainties described in "NIST Technical Note 1297, 1994 Edition". The approach, "Law of Propagation of Errors", involves the identification of all variables in an analytical method which are used to derive a result. These variables are related to the analytical result (R) by some functional relationship, R = constants * f(x,y,z,...). The components (x,y,z) are evaluated to determine their contribution to the overall method uncertainty. The individual component uncertainties (u_i) are then combined using a statistical model that provides the most probable overall uncertainty value. All component uncertainties are categorized as type A, evaluated by statistical methods, or type B, evaluated by other means. Uncertainties not included in the components, such as sample homogeneity, are combined with the component uncertainty as the square root of the sum-of-the-squares of the individual uncertainties. The uncertainty associated with the derived result is the combined uncertainty (u_c) multiplied by the coverage factor (1,2, or 3).

When three or more sample replicates are used to derive the analytical result, the type A uncertainty is the standard deviation of the mean value (S/vn), where S is the standard deviation of the derived results. The type B uncertainties are all other random or non-random components that are not included in the standard deviation.

The derivation of the general "Law of Propagation of Errors" equations and specific example are available on request.

Report Definitions

Action Lev	An agreed upon activity level used to trigger some action when the final result is greater than or equal to the Action Level. Often the Action Level is related to the Decision Limit.
Batch	The QC preparation batch number that relates laboratory samples to QC samples that were prepared and analyzed together.
Bias	Defined by the equation (Result/Expected)-1 as defined by ANSI N13.30.
COC No	Chain of Custody Number assigned by the Client or STL Richland.
Count Error (#s)	Poisson counting statistics of the gross sample count and background. The uncertainty is absolute and in the same units as the result. For Liquid Scintillation Counting (LSC) the batch blank count is the background.
Total Uncert (#s) *u_c - Combined Uncertainty.*	All known uncertainties associated with the preparation and analysis of the sample are propagated to give a measure of the uncertainty associated with the result, *u_c the combined uncertainty*. The uncertainty is absolute and in the same units as the result.
(#s), Coverage Factor	The coverage factor defines the width of the confidence interval, 1, 2 or 3 standard deviations.
CRDL (RL)	Contractual Required Detection Limit as defined in the Client's Statement Of Work or STL Richland "default" nominal detection limit. Often referred to the reporting level (RL)
Lc	Decision Level based on instrument background or blank, adjusted by the Efficiency, Chemical Yield, and Volume associated with the sample. The Type I error probability is approximately 5%. Lc=(1.645 * Sqrt(2*(BkgrndCnt/BkgrndCntMin)/SCntMin)) * (ConvFct/(Eff*Yld*Abn*Vol) * IngrFct). For LSC methods the batch blank is used as a measure of the background variability. Lc cannot be calculated when the background count is zero.
Lot-Sample No	The number assigned by the LIMS software to track samples received on the same day for a given client. The sample number is a sequential number assigned to each sample in the Lot.
MDC|MDA	Detection Level based on instrument background or blank, adjusted by the Efficiency, Chemical Yield, and Volume with a Type I and II error probability of approximately 5%. MDC = (4.65 * Sqrt((BkgrndCnt/BkgrndCntMin)/SCntMin) + 2.71/SCntMin) * (ConvFct/(Eff * Yld * Abn * Vol) * IngrFct). For LSC methods the batch blank is used as a measure of the background variability.
Primary Detector	The instrument identifier associated with the analysis of the sample aliquot.
Ratio U-234/U-238	The U-234 result divided by the U-238 result. The U-234/U-238 ratio for natural uranium in NIST SRM 4321C is 1.038.
Rst/MDC	Ratio of the Result to the MDC. A value greater than 1 may indicate activity above background at a high level of confidence. Caution should be used when applying this factor and it should be used in concert with the qualifiers associated with the result.
Rst/TotUcert	Ratio of the Result to the Total Uncertainty. If the uncertainty has a coverage factor of 2 a value greater than 1 may indicate activity above background at approximately the 95% level of confidence assuming a two-sided confidence interval. Caution should be used when applying this factor and it should be used in concert with the qualifiers associated with the result.
Report DB No	Sample Identifier used by the report system. The number is based upon the first five digits of the **Work Order** Number.
RER	The equation Replicate Error Ratio = (S-D)/[sqrt($TPUs^2$ + $TPUd^2$)] as defined by ICPT BOA where S is the original sample result, D is the result of the duplicate, TPUs is the total uncertainty of the original sample and TPUd is the total uncertainty of the duplicate sample.
SDG	Sample Delivery Group Number assigned by the Client or assigned by STL Richland upon sample receipt.
Sum Rpt Alpha Spec Rst(s)	The sum of the reported alpha spec results for tests derived from the same sample excluding duplicate result where the results are in the same units.
Work Order	The LIMS software assign test specific identifier.
Yield	The recovery of the tracer added to the sample such as Pu-242 used to trace a Pu-239/40 method.

STL Richland Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD Version: 05 Rpt Nbr: 34503 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGD310	B1KF86		MW6-SBB-A1	W06-009	W05029A					09/28/2006 11:20

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	3.14E+00	ug/L	3.2E-01	3.2E-01		8.28E-02		UTOT_KPA	2.53E-02	ML	02/19/2007 10:38	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGD410	B1KF90		MW6-SBB-A1	W06-009	W05029A					09/28/2006 09:50

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	2.21E+00	ug/L	2.3E-01	2.3E-01		8.12E-02		UTOT_KPA	2.58E-02	ML	02/19/2007 10:40	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGD610	B1KF94		MW6-SBB-A1	W06-009	W05029A					09/29/2006 10:23

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	2.67E+00	ug/L	2.7E-01	2.7E-01		8.15E-02		UTOT_KPA	2.57E-02	ML	02/19/2007 10:41	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGDM10	B1KF70		MW6-SBB-A1	W06-009	W05029A					09/28/2006 10:21

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	2.19E+00	ug/L	2.2E-01	2.2E-01		7.85E-02		UTOT_KPA	2.67E-02	ML	02/19/2007 10:28	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGDT10	B1KF74		MW6-SBB-A1	W06-009	W05029A					09/28/2006 09:41

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	2.64E+00	ug/L	2.7E-01	2.7E-01		8.32E-02		UTOT_KPA	2.52E-02	ML	02/19/2007 10:32	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9JPGDW10	B1KF82		MW6-SBB-A1	W06-009	W05029A					09/28/2006 08:51

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
7046185	Uranium	7440-61-1	2.01E+00	ug/L	2.1E-01	2.1E-01		8.35E-02		UTOT_KPA	2.51E-02	ML	02/19/2007 10:36	I

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

STL Richland QC Blank Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	JPGFN1AB	**Sdg/Rept Nbr:**	W05029A	34503	**Collection Date:** 09/28/2006 10:21
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BLK		**Received Date:** 02/14/2007

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AI	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
7046185	Uranium	-5.67E-03	ug/L	9.7E-04	U	8.22E-02			UTOT_KPA	2.55E-02	02/19/2007				D
BLK	7440-61-1			9.7E-04						ML	09:50				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

STL Richland QC Control Sample Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	JPGFN1CS	**Sdg/Rept Nbr:**	W05029A	34503	**Collection Date:** 09/28/2006 10:21
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 02/14/2007

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AJ	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
7046185	Uranium	3.32E+01	ug/L	3.9E+00		8.03E-02		3.45E+01	UTOT_KPA	2.61E-02	02/19/2007			70	D
BS	7440-61-1			3.9E+00				96.4		ML	10:24			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

STL Richland QC Control Sample Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	JPGFN1DS	**Sdg/Rept Nbr:**	W05029A	34503	**Collection Date:** 09/28/2006 10:21
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 02/14/2007

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AK	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
7046185	Uranium	3.59E+00	ug/L	3.7E-01		8.28E-02		3.58E+00	UTOT_KPA	2.53E-02	02/19/2007			70	D
BS	7440-61-1			3.7E-01				100.4		ML	10:26			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

STL Richland QC Duplicate Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	JPGDM1CR	**Sdg/Rept Nbr:**	W05029A	34503	**Collection Date:** 09/28/2006 10:21
Client Id:	B1KF70	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	DUP		**Received Date:** 02/14/2007

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
W06-009	MW6-SBB-A19981								AG	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
7046185	Uranium	2.22E+00	ug/L	2.3E-01		8.19E-02			UTOT_KPA	2.56E-02	02/19/2007	1.2	0.2		D
DUP	7440-61-1	2.19E+00		2.3E-01						ML	10:30	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

STL Richland Qc Matrix Spike Report

Lab Code: STLRL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05029A.Edd, h:\Reportdb\edd\FeadIV\Rad\34503.E

Lab Sample Id:	JPGDT1CW	**Sdg/Rept Nbr:**	W05029A	34503	**Collection Date:** 09/28/2006 09:41
Client Id:	B1KF74	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	**MS**		**Received Date:** 02/14/2007

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
W06-009	MW6-SBB-A19981								AH	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
7046185	Uranium	3.46E+01	ug/L	4.4E+00		8.22E-02		3.53E+01	UTOT_KPA	2.55E-02	02/19/2007			60	D
MS	7440-61-1			4.4E+00				97.9		ML	10:34			140	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

SEVERN TRENT STL

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

2/19/2007 3:08:17 PM

Lot No., Due Date: J7B150140; 02/19/2007

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 7046185; RUNAT UNat by KPA

SDG, Matrix: W05029A; WATER

	Yes	No	N/A
1.0 COC			
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	✓		
2.0 QC Batch			
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	✓		
2.2 Are the QC appropriate for the analysis included in the batch?	✓		
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	✓		
2.4 Does the Worksheets include a Tracer Vial label for each sample?	✓		
3.0 QC & Samples			
3.1 Is the blank results, yield, and MDA within contract limits?	✓		
3.2 Is the LCS result, yield, and MDA within contract limits?	✓		
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	✓		
3.4 Are the duplicate result, yields, and MDAs within contract limits?	✓		
3.5 Are the sample yields and MDAs within contract limits?	✓		
4.0 Raw Data			
4.1 Were results calculated in the correct units?	✓		
4.2 Were analysis volumes entered correctly?	✓		
4.3 Were Yields entered correctly?	✓		
4.4 Were spectra reviewed/meet contractual requirements?	✓		
4.5 Were raw counts reviewed for anomalies?			
5.0 Other			
5.1 Are all nonconformances included and noted?			✓
5.2 Are all required forms filled out?	✓		
5.3 Was the correct methodology used?	✓		
5.4 Was transcription checked?	✓		
5.5 Were all calculations checked at a minimum frequency?	✓		
5.6 Are worksheet entries complete and correct?	✓		

6.0 Comments on any No response:

First Level Review _____ **Date** 2/19/07

SEVERN TRENT STL

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

QC Batch Number: 7046185
W050294

Review Item	Yes (√)	No (√)	N/A (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?	✓		
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery with contract acceptance criteria?	✓		
7. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
8. Do the MS/MSD results and yields meet acceptance criteria?	✓		
9. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Nonconformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response:

Second Level Review: Sheryl A Adams Date: 2-20-07

J7B150140 W05024 3DAY TAT!! Due Mon 2/19/07

STL RICHLAND

PNNL J6I290217 W05029 due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # **W06-009-91**

Collector: DURATEK F. M. HALL	Contact/Requester: Dot Stewart	Telephone No.: 509-376-5056 / MSIN / FAX
SAF No.: W06-009	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: RCRA, SEPTEMBER 2006	DTS SAWS - H108	Ice Chest No.: FS-001 / Temp.
Shipped To (Lab): Severn Trent Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: RCRA	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS

** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐

Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.

Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF70		W	9/28/6	1021	1x20-mL P	Activity Scan	None
B1KF70		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF70		W			1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPGDM	HCl to pH <2
B1KF70		W			1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						~~JFCG4~~	

Relinquished By	Date/Time	Received By	Date/Time
DURATEK F. M. HALL (Print / Sign) [signature]	SEP 28 2006 / 1140	S. Smith (Print) S. Smith (Sign)	SEP 28 2006 / 1140
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time

Matrix *

S = Soil	DS = Drum Solid
SE = Sediment	DL = Drum Liquid
SO = Solid	T = Tissue
SL = Sludge	WI = Wipe
W = Water	L = Liquid
O = Oil	V = Vegetation
A = Air	X = Other

FINAL SAMPLE DISPOSITION — Disposal Method (e.g., Return to customer, per lab procedure, used in process) | Disposed By | Date/Time

SEVERN TRENT STL

Sample Check-in List

Date/Time Received: 9.28.06 11:40

Client: PBW SDG#: W05029 NA [ ] SAF#: W06-009 NA [ ]

Work Order Number: JGI290217 Chain of Custody # W06-009-91

Shipping Container ID: FS-001 Air Bill # N/A

1. Custody Seals on shipping container intact? NA [ ] Yes [ ] No [ ]
2. Custody Seals dated and signed? NA [ ] Yes [ ] No [ ]
3. Chain of Custody record present? Yes [ ] No [ ]
4. Cooler temperature: _____ NA [ ] 5. Vermiculite/packing materials is NA [ ] Wet [ ] Dry [ ]
6. Number of samples in shipping container: /
7. Sample holding times exceeded? NA [ ] Yes [ ] No [ ]
8. Samples have:
   _____tape
   _____custody seals
   _____hazard labels
   ___<___appropriate samples labels
9. Samples are:
   ___<___in good condition
   _____broken
   _____leaking
   _____have air bubbles
   (Only for samples requiring head space)
10. Sample pH taken? NA [ ] pH<2 [ ] pH>2 [ ] adjusted pH [ ]
11. Sample Location, Sample Collector Listed? *
    *For documentation only. No corrective action needed. Yes [ ] No [ ]
12. Were any anomalies identified in sample receipt? Yes [ ] No [ ]
13. Description of anomalies (include sample numbers): N/A

Sample Custodian: L. Smith Date: 9.28.06 11:40

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

LS-023, 12/05, Rev. 6

JTB 150140 W05029A

PNNL J6I290228 W05029 DURATEK D. WALL Due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # W06-009-97

Page 1 of 1

Due 02-19-07

STL RICHLAND

Collector	**Contact/Requester** Dot Stewart	**Telephone No.** 509-376-5056 **MSIN** **FAX**
SAF No. W06-009	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title RCRA, SEPTEMBER 2006	DTS-SAWS-111 3	**Ice Chest No.** AES-04022 **Temp.**
Shipped To (Lab) Severn Trent Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol RCRA	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.
Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF74		W	9-28-06	0941	1x20-mL P	Activity Scan	None
B1KF74		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF74		W			1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPGDT	HCl to pH <2
B1KF74		W	↓	↓	1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						~~JEC8D~~	

1335 RW 9/28/06 1335 RW 9/28/06

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
DURATEK D. WALL	D. Wall	D. Wall	SEP 28 2006 1335	L. Smith	S. Smith	S. Smith	SEP 28 2006 1335
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

107

SEVERN TRENT STL

Sample Check-in List

Date/Time Received: 9.28.06 11:35

Client: PGW SDG #: W05029 NA [ ] SAF #: W06-009 NA [ ]

Work Order Number: J6I290228 Chain of Custody # W06-009-97

Shipping Container ID: AES-04-022 Air Bill # N/A

1. Custody Seals on shipping container intact? NA [ ] Yes [X] No [ ]
2. Custody Seals dated and signed? NA [ ] Yes [X] No [ ]
3. Chain of Custody record present? Yes [X] No [ ]
4. Cooler temperature: _____ NA [X] 5: Vermiculite/packing materials is NA [X] Wet [ ] Dry [ ]
6. Number of samples in shipping container: 1
7. Sample holding times exceeded? NA [X] Yes [ ] No [ ]
8. Samples have:
   _____ tape
   _____ custody seals
   _____ hazard labels
   _____ appropriate samples labels
9. Samples are:
   ✓ in good condition
   _____ broken
   _____ leaking
   _____ have air bubbles
   (Only for samples requiring head space)
10. Sample pH taken? NA [ ] pH≤2 [X] pH>2 [ ] adjusted pH [ ]
11. Sample Location, Sample Collector Listed? *
    *For documentation only. No corrective action needed. Yes [X] No [ ]
12. Were any anomalies identified in sample receipt? Yes [ ] No [X]
13. Description of anomalies (include sample numbers): N/A

Sample Custodian: L. Smith Date: 9.28.06 1335 1135

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

LS-023, 12/05, Rev. 6

JTB150140 W05029A Due 02-19-07

PNNL JGI290386 W05029 Due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # **W06-009-109**

Page 1 of 1

STL RICHLAND

Collector: ~~D. R. BREWINGTON~~ L. D. WALL	Contact/Requester: Dot Stewart	Telephone No.: 509-376-5056	MSIN:	FAX:
SAF No.: W06-009	Sampling Origin: Hanford Site	Purchase Order/Charge Code:		
Project Title: RCRA, SEPTEMBER 2006	DTS-SAWS-11113	Ice Chest No.: AF-504-022	Temp.	
Shipped To (Lab): Severn Trent Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.		
Protocol: RCRA	Priority: 45 Days	Offsite Property No.		

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.
Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF82		W	9-29-06	0951	1x20-mL P	Activity Scan	None
B1KF82		W			1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF82		W			1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPG DW	HCl to pH <2
B1KF82		W			1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						~~JFENJ~~	
			9/29/06				

L.D WALL L. Wall

Relinquished By: ~~DURATEK~~ ~~D. R. BREWINGTON~~	Print	Sign	Date/Time: 14:00 SEP 29 2006	Received By: S. Smith	Print	Sign S. Smith	Date/Time: 14:00 SEP 29 2006
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

109

J7B150140 W05029A Due 12-19-07

PNNL J6I290386 W05029 Due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # W06-009-115

Page 1 of 1

Collector: DURATEK L. D. WALL	Contact/Requester: Dot Stewart	Telephone No.: 509-376-5056 MSIN FAX
SAF No.: W06-009	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: RCRA, SEPTEMBER 2006	DTS-SAWS-H113	Ice Chest No.: AFS-04022 Temp.
Shipped To (Lab): Severn Trent Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: RCRA	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS

** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐

Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.

Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF86		W	9-29-06	1120	1x20-mL P	Activity Scan	None
B1KF86		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF86		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPGD3	HCl to pH <2
B1KF86		W	↓	↓	1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						JFENW	

Relinquished By: DURATEK L. D. WALL — Print / Sign: L.D. Wall	Date/Time: 14:00 SEP 29 2006	Received By: S. Smith — Print / Sign: S. SMITH	Date/Time: 14:00 SEP 29 2006
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

SEE RUSHING

110

JTB150140 W05029A Due 02-19-07

PNNL J6I290386 W05029 Due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # W06-009-121

Collector: DURATEK D. WALL	Contact/Requester: Dot Stewart	Telephone No.: 509-376-5056 MSIN FAX
SAF No.: W06-009	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: RCRA, SEPTEMBER 2006	DTS-SAWS-H113	Ice Chest No. APS-04022 Temp.
Shipped To (Lab): Severn Trent Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: RCRA	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.
Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF90		W	9-29-06	0950	1x20-mL P	Activity Scan	None
B1KF90		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF90		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPGD4	HCl to pH <2
B1KF90		W	↓	↓	1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						~~JFEN3~~	

Relinquished By	Date/Time	Received By	Date/Time
DURATEK D. WALL (Print) D. O. Wall (Sign)	SEP 29 2006 14:04	S. Smith (Sign) S. Smith (Print)	SEP 29 2006 14:00
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time

Matrix *

S = Soil	SE = Sediment	DS = Drum Solid	DL = Drum Liqui
SO = Solid	SL = Sludge	T = Tissue	WI = Wine
W = Water	O = Oil	L = Liquid	V = Vegetation
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

111

J7B150140 W05029A Due 02-19-07

PNNL J6I290386
W05029
Due 11-13-06

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

C.O.C. # **W06-009-127**

Page 1 of 1

Collector DURATEK L. D. WALL	**Contact/Requester** Dot Stewart	**Telephone No.** 509-376-5056	**MSIN**	**FAX**
SAF No. W06-009	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**		
Project Title RCRA, SEPTEMBER 2006	DTS-SAWS-H113	**Ice Chest No.** AFS-04022	**Temp.**	
Shipped To (Lab) Severn Trent Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**		
Protocol RCRA	**Priority:** 45 Days	**Offsite Property No.**		

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Batch all PNNL GW samples submitted under "W", "S", "I", "A" or "G" 06 SAFs into one SDG, not to exceed SDG closure of 14 days.
Submit invoices & deliverables to DL Stewart, PNNL

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1KF94		W	9-29-06	1023	1x20-mL P	Activity Scan	None
B1KF94		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
B1KF94		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1) JPG 06	HCl to pH <2
B1KF94		W	↓	↓	1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
						~~FFERA~~	

Relinquished By DURATEK L. D. WALL R. D. Wall Date/Time SEP 29 2006 14:00	Received By S. Smith S. Smith Date/Time SEP 29 2006 14:00	Matrix *	
Relinquished By Date/Time	Received By Date/Time	S = Soil, SE = Sediment, SO = Solid, SL = Sludge, W = Water, O = Oil, A = Air	DS = Drum Solid, DL = Drum Liqui, T = Tissue, WI = Wipe, L = Liquid, V = Vegetation, X = Other
Relinquished By Date/Time	Received By Date/Time		
Relinquished By Date/Time	Received By Date/Time		

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

STL RICHLAND

112

SEVERN TRENT STL

Sample Check-in List

Date/Time Received: 9-29-06 14:00

Client: PSW SDG #: W05029 NA [ ] SAF #: W06-009 NA [ ]

Work Order Number: JGT290386 Chain of Custody # W06-009-109, 115, 121, 127

Shipping Container ID: AFS-04-022 Air Bill # N/A

1. Custody Seals on shipping container intact? NA [ ] Yes [X] No [ ]
2. Custody Seals dated and signed? NA [ ] Yes [X] No [ ]
3. Chain of Custody record present? Yes [X] No [ ]
4. Cooler temperature: _____ NA [X] 5. Vermiculite/packing materials is NA [X] Wet [ ] Dry [ ]
6. Number of samples in shipping container: 4
7. Sample holding times exceeded? NA [X] Yes [ ] No [ ]
8. Samples have:
   _____ tape
   _____ custody seals
   _____ hazard labels
   ____X__ appropriate samples labels
9. Samples are:
   ____X__ in good condition
   _____ broken
   _____ leaking
   _____ have air bubbles
   (Only for samples requiring head space)
10. Sample pH taken? NA [ ] pH<2 [X] pH>2 [ ] adjusted pH [ ]
11. Sample Location, Sample Collector Listed? *
    *For documentation only. No corrective action needed. Yes [X] No [ ]
12. Were any anomalies identified in sample receipt? Yes [ ] No [X]
13. Description of anomalies (include sample numbers): N/A

Sample Custodian: S. Smith Date: 9-29-06 14:00

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

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2/19/2007 9:02:18 AM

Sample Preparation/Analysis

Balance Id:1120482733

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

DH UNat_Laser PrpRC5015
SS Total Uranium by KPA
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 02/19/2007

Sep1 DT/Tm Tech:

Batch: 7046185 WATER ug/L PM, Quote: SA , 57671

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,BockJ

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 JPGDM-1-AA J7B150140-1-SAMP 09/28/2006 10:21		26.70g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
2 JPGDM-1-AC-X J7B150140-1-DUP 09/28/2006 10:21		25.60g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
3 JPGDT-1-AA J7B150140-2-SAMP 09/28/2006 09:41		25.20g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
4 JPGDT-1-AC-S J7B150140-2-MS 09/28/2006 09:41		25.50g,in AmtRec: 500MLP	UNSF3597 02/05/07,pd 01/23/07,r #Containers: 1			Scr:	Alpha:	Beta:
5 JPGDW-1-AA J7B150140-3-SAMP 09/28/2006 08:51		25.10g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
6 JPGD3-1-AA J7B150140-4-SAMP 09/28/2006 11:20		25.30g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
7 JPGD4-1-AA J7B150140-5-SAMP 09/28/2006 09:50		25.80g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:

2/19/2007 9:02:21 AM

Sample Preparation/Analysis

Balance Id:1120482733

384868, Pacific Northwest National Laboratory , Pacific Northwest National Lab

DH UNat_Laser PrpRC5015
SS Total Uranium by KPA
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 02/19/2007

Sep1 DT/Tm Tech:

Batch: 7046185 WATER ug/L PM, Quote: SA , 57671

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,BockJ

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 JPGD6-1-AA J7B150140-6-SAMP 09/29/2006 10:23		25.70g,in AmtRec: 500MLP	#Containers: 1			Scr:	Alpha:	Beta:
9 JPGFN-1-AA-B J7B150000-185-BLK 09/28/2006 10:21		25.50g,in AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:
10 JPGFN-1-AC-C J7B150000-185-LCS 09/28/2006 10:21		26.10g,in AmtRec:	UNSF3598 02/05/07,pd 01/23/07,r #Containers: 1			Scr:	Alpha:	Beta:
11 JPGFN-1-AD-C J7B150000-185-LCS 09/28/2006 10:21		25.30g,in AmtRec:	UNSC1492 01/23/07,pd 04/28/06,r #Containers: 1			Scr:	Alpha:	Beta:

Comments:

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SA , 57671

JPGDM1AA-SAMP Constituent List:
Uranium RDL:1.44E-01 ug/L LCL: UCL: RPD:
JPGDT1AC-MS:

JPGFN1AA-BLK:
Uranium RDL:1.44E-01 ug/L LCL: UCL: RPD:
JPGFN1AC-LCS:
Uranium RDL:0.144343 ug/L LCL:70 UCL:130 RPD:20

ICOC Fraction Transfer/Status Report

ByDate: 2/19/2006, 2/24/2007, Batch: '7046185', User: *ALL Order By DateTimeAccepting

Q	Batch	Work Ord	CurStatus	Accepting		Comments
7046185						
AC		**Prep2C**	**BockJ**	2/15/2007 10:05:32		
SC			wagarr	IsBatched	2/15/2007 9:14:36 AM	ICOC_RADCALC v4.8.26
SC			BockJ	InPrep	2/15/2007 10:05:32 AM	rich-rc-5017 rEVISION 5
SC			BockJ	Prep1C	2/15/2007 10:18:18 AM	RICH-RC-5015 REVISION 4
SC			AntonsonL	Prep2C	2/19/2007 9:17:52 AM	RICH-RC-5015 REVISION 4
AC			**BockJ**	2/15/2007 10:18:18		
AC			**AntonsonL**	2/19/2007 9:17:52		

AC: Accepting Entry; SC: Status Change